

WHAT IS CLAIMED IS

1. A sound-scale generation device comprising:

a clock means counting a time and generating a sound generation instruction signal at a fixed time,

5 a sound generator able to generate a sound of a 12-sounds scale,

a sound generating controller linking a sound of each sound-scale the 12-sounds scale and a time corresponding to the fixed time and controlling the sound generator so as to generate a basic sound defined as one sound of the 12-sounds scale, and generate a first scale-forming-sound corresponding to the time at which receiving the sound generation instruction signal, and

a harmonic-sound forming sound adder
15 controlling the sound generator so as to generate a sound by superposing at least one of the harmonic-sound forming sounds able to form a harmonic-sound including the first scale-forming-sound when the sound generating controller makes the sound generator generate a second scale-forming-sound of a dissonant interval and/or imperfect consonant interval with respect to the basic sound.

2. A sound-scale generation device as set forth in claim 1, wherein the harmonic-sound forming sound adder controls the sound generator so as to generate a sound by
25 superposing at least one of the harmonic-sound forming

sounds able to form a harmonic-sound including the first scale-forming-sound when the sound generating controller makes the sound generator generate a third scale-forming-sound corresponding to a black key interval with respect
5 to the basic sound.

3. A sound-scale generation device as set forth in claim 1, wherein the harmonic-sound forming sound adder controls the sound generator so as to generate a sound by superposing at least one of the harmonic-sound forming
10 sounds able to form the harmonic-sound including the basic sound when the sound generating controller makes the sound generator generate the basic sound.

4. A sound-scale generation device as set forth in claim 1, wherein the sound generating controller controls
15 the sound generator so as to generate an announcement sound for announcing the basic sound before making the sound generator generate the basic sound.

5. A sound-scale generation device as set forth in claim 1, further comprising:

20 a center position light emitting means provided at a substantially center position of a faceplate displaying the scale-forming-sound corresponding to the fixed times and emitting light at the fixed time and
time light emitting means provided at positions
25 corresponding to the scale-forming-sounds corresponding

to the fixed times so as to surround the center position light emitting means and emitting light corresponding to the scale-forming-sounds.

6. A sound-scale generation device as set forth in claim 1, wherein the sound generating controller controls the sound generator so that the type of generation of the first scale-forming-sounds differ between even times and odd times among times linked with the sounds of the 12-sounds scale.

7. A sound-scale generation device as set forth in claim 1, wherein the sound generating controller controls the sound generator so as to generate the basic sound, then generate a fourth scale-forming-sound corresponding to that time by a tempo different between even times and odd times among times linked with the sounds of the 12-sounds scale.

8. A time-announcing clock announcing a fixed time, comprising:

a clock means counting a time and generating a sound generation instruction signal at a fixed time,

a sound generator able to generate a sound of a 12-sounds scale,

a sound generating controller linking a sound of the 12-sounds scale and a time corresponding to the fixed time and controlling the sound generator so as to

generate a basic sound defined as one sound of the 12-sounds scale, then generate a first scale-forming-sound corresponding to the time at which receiving the sound generation instruction signal, and

- 5 a harmonic-sound forming sound adder
- controlling the sound generator so as to generate a sound by superposing at least one of the harmonic-sound forming sounds able to form a harmonic-sound including the first scale-forming-sound when the sound generating controller
- 10 makes the sound generator generate a second scale-forming-sound of a dissonant interval and/or imperfect consonant interval with respect to the basic sound.